

FOOD VALUE, THE ONLINE MARKETPLACE THAT REALLY MAKES LOCAL FOOD CHAINS TAKE OFF

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Abstract

If we want more farmers to change from mainstream farming to a polyculture/agroforestry approach, then we must deal with the fact that selling the produce can become a serious hindrance. Food Value, an online marketplace software, can help on the level of sales, marketing, and administration. Food value can create continuity and service for customers. This may contribute in using the land in a more sustainable and biodiverse way since, with this local market model, earning a proper income can become easier, transportation would be shorter and therefore more sustainable, and the relation between farmers/rural areas and the city could improve. Food Value allows groups of farmers, professionals and consumers in the city to be organized as a group that works together. Food Value groups will stay in charge of their own data because the software will be owned by a cooperation and each group can become a member.

Keywords: social; online marketplace; local; food chain

Introduction

- if more and more farmers can no longer make a living,
- if the landscape loses all its biodiversity,
- if soil fertility is heading towards zero,
- if sustainability becomes a necessity,
- if population - and recreational pressure becomes ever greater,
- and if public health issues are growing

How long can we maintain the habit, in densely populated areas of Europe, to use our land to produce for a global market?

If the few farmers we still have could produce with an agro-ecological approach, including agroforestry, for costumers in the same city or neighborhood, this might allow using the land in a more sustainable and biodiverse way, since transportation would be shorter distance and therefore more sustainable, and the relation between farmers/rural areas and the city could improve.

But, how can such an ecological local food chain be organized?

The necessity of an online marketplace

Every city or region has different circumstances, players and activities, but marketplace software plays a major role everywhere. In fact, one of the biggest obstacles to the development of local and direct (from farmer directly to consumer) markets is the administrative hassle that arises when farmers start selling their produce directly to many different customers. Another issue is that the local market needs to have enough scale and continuity, when seen from a customer perspective. “Food Value” is a software designed to tackle these two challenges. The aim of Food Value is to serve as many local food groups as well and as quickly as possible with software developed as efficiently as possible. This will allow more food groups to start and to organize themselves together, thus creating new scale for local and regional agriculture. With Food Value, farmers, food processors (butchers, bakers etc.), caterers, restaurants, shops and consumers can organize themselves into various types of groups around their offers and demands. Together they form a trust-based chain of professionals and customers that ensures a viable long-term market for local food production.

Materials and methods

What is and what can Food Value do?

Food Value is online marketplace software that enables local food chains to fully organize themselves at a very low cost. Food Value is an open source and cooperatively organized tool. The software is capable of automating administration and payments and facilitates communication between the members of the group in many ways.

How the tool works

In Food Value, farmers have their own shop (Figure 1). There they can publish their produce and decide on things like stock and price. They become vendors in the system. For the customers, whether they are professional middlemen or final consumer, the platform looks like a webshop (Figure 2). They can buy from all the little shops as if it were a single shop. The system deals with all the administration, payments, margins and communicates with the chosen logistic partner or partners. Margins and logistic systems can be implemented according to the wishes of the group. All participants in the group, whether they are vendors or customers, are members. Apart from the webshop, participants can also communicate with each other and form subgroups. For example: a restaurant can discuss the menu with its suppliers.

More information about the tool and a working demo can be found at: <https://foodvalue.nl/> (also in English)

Technical background

Food Value is based on an Open Source software: Wordpress. This ensures that development costs will stay low, and that development will continue to happen within the community and that developers will be continue to be available. Before releasing it, Food Value was tested with real farmers, shops and logistics partners. Currently the tool is ready to use, but it must be further developed in order to become open source itself as well.

Organisational structure

Food Value has been developed by the company “The Plant” and tested in cooperation with the above-mentioned partners. Now it is ready for use. To ensure that the original vision and the data of its users is fully protected, The Plant will hand over its ownership rights to a cooperation. All groups using Food Value for their local food chain administration will become members.

Discussion

From the experience of co-designing and improving Food Value it was concluded that a successful Food Value group should arrange the following things well:

The group should have **sufficient size**. The professional parties must know and trust each other and want to work together. There must be a sufficient and diverse range of vendors in the group to ensure continuity in the offering part of the marketplace. And there must be enough buyers in the system to be economically interesting for the vendors and the whole marketplace. Of course, the required critical mass can be achieved gradually, but it is important to set a goal.

The reaching of this goal must be monitored by a **professional coordinator**. This coordinator must dedicate sufficient time (at least one day/week) to the job, and should be preferably not a vendor in the system.

Each group must have a **pre-agreed logistics system**. From our experience, tests and brainstorming, two systems have emerged. In one system, the farmer owns a refrigerated van and drives around to pick up and deliver. This system works very well if there is just one or a few big clients in the group (e.g. a big canteen or just a few restaurants). The other system is to work with a central hub in each city. Farmers bring their harvest to this hub at least once a week. The hub owner preferably uses an electric vehicle and delivers the produce around the city. The shipping costs in the system are paid by this logistics partner. Of course, city residents can also pick up their orders at the hub themselves.

Muriël Simonis Msc Antropology conducted research on group behavior and group forming during the project and her research report is published here, in Dutch.

<https://drive.google.com/drive/folders/1uNpeyEa44WzmrJIFYVA6Nbxddq0cerBO?usp=sharing>

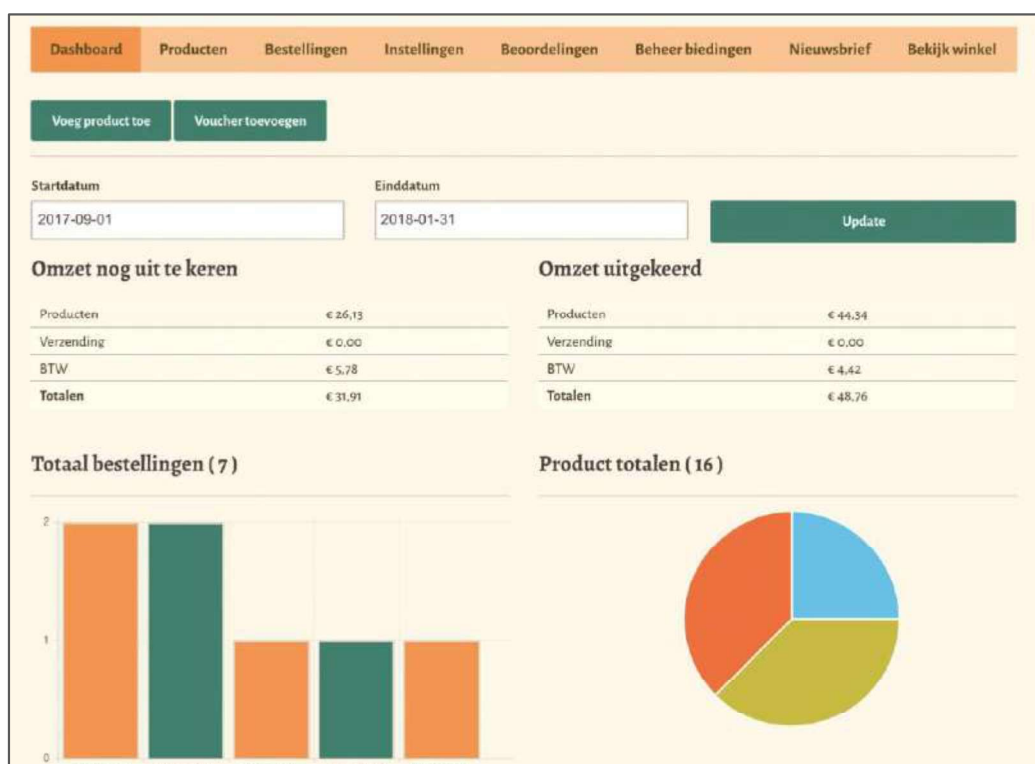


Figure 1: Example of the vendor/farmer dashboard. The farmer can completely control his products and prices and get an overview of the revenues.

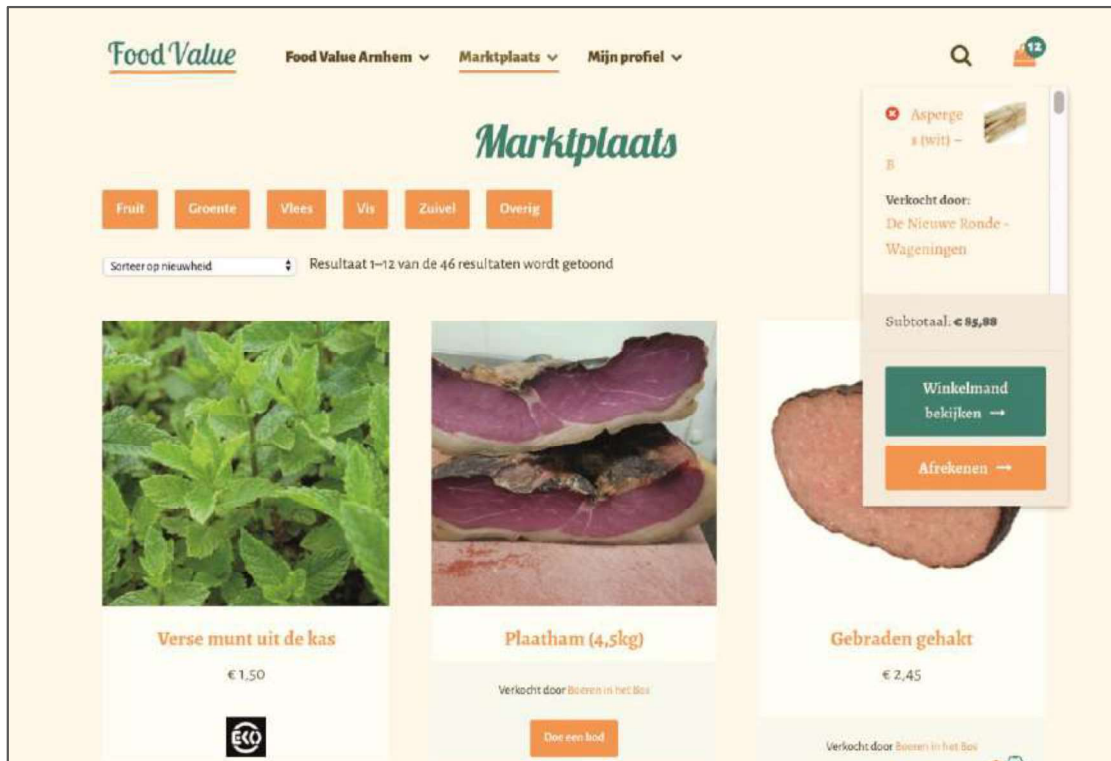


Figure 2: Example of the webshop/marketplace where all the shops of all the farmers come together.